

UAS Demand Generation and Airspace Performance Impact Prediction, Phase I

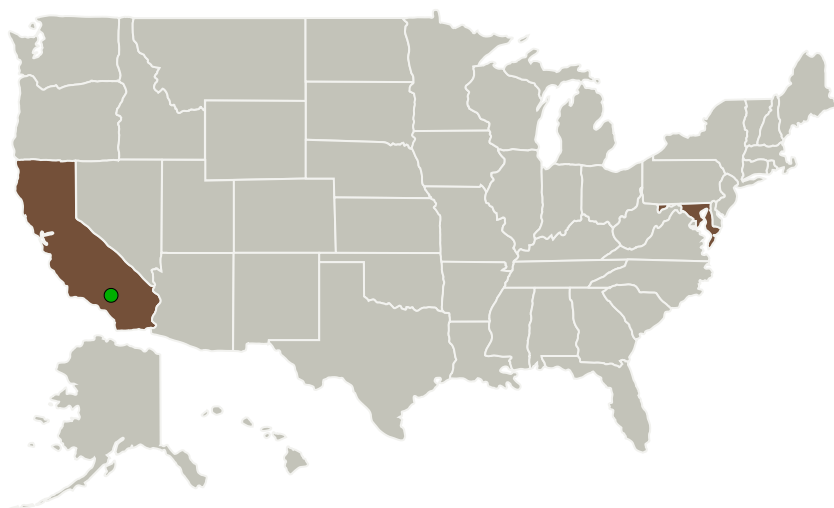
Completed Technology Project (2012 - 2012)



Project Introduction

IAI and its academic partner propose to develop technology that will generate credible future demand for UAS vehicles given proposed UAS missions. The technology will consist of three parts. The first part is an activity-based modeling system that translates inchoate mission profile information into overall demand between city pairs and counties for UAS aircraft. The second part translates the overall demand into specific flight data sets, specifying the origin, destination, scheduled departure and arrival times, as well as the type of aircraft flown along the route. The final part consists of a data warehouse system that will store the flight data sets and allow analysts to retrieve them to support custom UAS studies.

Primary U.S. Work Locations and Key Partners



Organizations Performing Work	Role	Type	Location
Intelligent Automation, Inc.	Lead Organization	Industry	Rockville, Maryland
● Armstrong Flight Research Center(AFRC)	Supporting Organization	NASA Center	Edwards, California



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Primary U.S. Work Locations

California

Maryland

Project Transitions



February 2012: Project Start



August 2012: Closed out

Closeout Documentation:

- Final Summary Chart(<https://techport.nasa.gov/file/137741>)

Organizational Responsibility

Responsible Mission Directorate:

Space Technology Mission Directorate (STMD)

Lead Organization:

Intelligent Automation, Inc.

Responsible Program:

Small Business Innovation Research/Small Business Tech Transfer

Project Management

Program Director:

Jason L Kessler

Program Manager:

Carlos Torrez

Principal Investigator:

Frederick Wieland

Co-Investigator:

Frederick Wieland

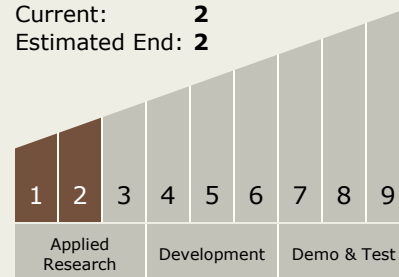
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Technology Maturity (TRL)

Start: **1**
Current: **2**
Estimated End: **2**



Technology Areas

Primary:

- TX16 Air Traffic Management and Range Tracking Systems
 - └ TX16.1 Safe All Vehicle Access

Target Destinations

The Moon, Mars, Outside the Solar System, The Sun, Earth, Others Inside the Solar System